California Environmental Protection Agency
AIR RESOURCES BOARD

Executive Order G-70-196

Certification of the
Saber Technologies, LLC SaberVac VR Phase II Vapor Recovery System

WHEREAS, the California Air Resources Board ("the Board" or "CARB") has established, pursuant to California Health and Safety Code sections 39600, 39601 and 41954, certification procedures for systems designed for the control of gasoline vapor emissions during motor vehicle fueling operations (Phase II vapor recovery systems) in its "CP-201 Certification Procedure for Vapor Recovery Systems of Dispensing Facilities" (the "Certification Procedures") as last amended April 28,2000, incorporated by reference into Title 17, California Code of Regulations, Section 94011;

WHEREAS, the Board has established, pursuant to California Health and Safety Code sections 39600, 39601 and 41954, test procedures for determining the compliance of Phase II vapor recovery systems with emission standards in its "Certification and Test Procedures for Vapor Recovery Systems," CP-201.1 through CP-201.6 ("the Test Procedures") as incorporated by reference into Title 17, California Code of Regulations, Section 94011;

WHEREAS, W. Dwain Simpson of Saber Technologies, LLC. ("Saber"), has requested certification of the Husky 605104 Nozzle with the SaberVac vacuum assist vapor recovery system (SaberVac VR system) pursuant to the Certification Procedures and Test Procedures;

WHEREAS, the certification of the SaberVac VR system has been evaluated pursuant the Board's Certification Procedures;

WHEREAS, the Certification Procedures (CP-201) provide that the Executive Officer shall issue an order of certification if he or she determines that the vapor recovery system conforms to all of the applicable requirements set forth in the Certification Procedures; and

WHEREAS, I, Michael P. Kenny, Air Resources Board Executive Officer, find that the SaberVac VR system conforms with all the requirements set forth in the Certification Procedures, and results in a vapor recovery system which is at least 95 percent effective for attendant and/or self-serve use at gasoline service stations when used *as specified in Exhibits 1 and 2 and when used* in conjunction with a Phase I vapor recovery system which has been certified by the Board.

NOW, THEREFORE, IT IS HEREBY ORDERED that the SaberVac VR system when used with a CARB-certified Phase I system, as specified in Exhibits 1 and 2 of this Order, is certified to be at least 95 percent effective in attended and/or self-serve mode. **Compatibility of this system with the onboard vapor recovery systems (ORVR) systems was verified using *a CARB draft test procedure. The system may need further ORVR compatibility evaluation to show compatibility with ORVR requirements as approved by the Board on March 23, 2000.* Fugitive emissions, which may occur when the underground storage tanks are under positive pressure have not been quantified and were not included in the calculation of system effectiveness.** Exhibit 1 contains a list of the equipment certified for

use with the SaberVac VR System. Exhibit 2 contains installation and performance specifications for the system. Exhibit 3 contains a procedure for verifying dispensing rate.

IT IS FURTHER ORDERED that the dispensing rate for installations with the SaberVac VR System shall not exceed ten (10.0) gallons per minute at any nozzle. This is consistent with the flowrate limitation imposed by United States Environmental Protection Agency as specified in the Title 40, Code of Federal Regulations, Part 80, section 80.22. Dispensing rate shall be verified as specified in Exhibit 3.

IT IS FURTHER ORDERED that compliance with the certification requirements and rules and regulations of the Division of Measurement Standards of the Department of Food and Agriculture, the State Fire Marshal's Office, and the Division of Occupational Safety and Health of the Department of Industrial Relations is made a condition of this certification.

IT IS FURTHER ORDERED that the following requirements are made a condition of certification. The SaberVac VR System shall be installed only in facilities *that* are capable of demonstrating on-going compliance with the vapor integrity requirements *of TP-201.3*. The owner or operator of the installation shall conduct, and pass, a Static Pressure Decay test as specified in *TP-201.3*, no later than 60 days after startup and at least once in each twelve month period. The owner or operator of the installation shall conduct, and pass, an Air-to-Liquid Ratio test as specified in TP-201.5 no later than 60 days after startup and at least once in each twelve month period thereafter. The test results shall be made available to the local air pollution control or air quality management district upon request within fifteen calendar days after the tests are conducted, or within fifteen calendar days of the request. These results should be submitted in a district approved format. Alternative test procedures may be used if determined by the Executive Officer, in writing, to yield comparable results.

IT IS FURTHER ORDERED that the SaberVac VR system, as installed, shall demonstrate compliance with the procedures and performance standards the test installation was required to meet during certification testing. If, in the judgment of the Executive Officer, a significant fraction of installations fail to meet the specifications of this certification, or if a significant portion of the vehicle population is found to have configurations which significantly impair the system's collection efficiency, the certification itself may be subject to modification, suspension or revocation.

IT IS FURTHER ORDERED that the certified SaberVac VR system shall, at a minimum, be operated in accordance with the manufacturer's recommended maintenance intervals and shall use the manufacturer's recommended operation, installation, and maintenance procedures.

IT IS FURTHER ORDERED that the Husky Model 605104 nozzle which is approved for use with the SaberVac VR system shall be 100 percent performance checked at the factory, including checks of the integrity of the vapor and liquid path, as specified in Exhibit 2 of this Order, and of the proper functioning of all automatic shut-off mechanisms.

IT IS FURTHER ORDERED that each vapor pump shall be adjusted and 100 percent performance checked at the factory, including verification that the pump, upon installation, will perform within the air-to-liquid ratio range specified in Exhibit 2 of this Order.

IT IS FURTHER ORDERED that the certified SaberVac VR system shall be performance tested during installation for ability to dispense gasoline and collect vapors, in the presence of the station manager or other responsible individual. Saber Technologies shall provide, to the station owner, operator or designee, CARB-approved copies of the installation and maintenance manuals along with instructions in the proper use of the SaberVac VR system, its repair and maintenance schedule, and where system and/or component replacements can be

readily obtained, which are to be stored at the facility. Revisions to the manual are subject to approval by CARB.

IT IS FURTHER ORDERED that the SaberVac VR system shall, at a minimum, be operated in accordance with the manufacturer's recommended maintenance intervals and shall use the manufacturer's recommended operation, installation, and maintenance procedures.

IT IS FURTHER ORDERED that the certified SaberVac VR system shall be warranted by Saber Technologies, in writing, for at least one year, to the ultimate purchaser and each subsequent purchaser, that the vapor recovery system is designed, built and equipped so as to conform at the time of original installation or sale with the applicable regulations and is free from defects in materials and workmanship which would cause the vapor recovery system to fail to conform with applicable regulations. Saber Technologies shall provide copies of the manufacturer's warranty for the system to the station manager, owner or operator. All components shall be warranted to the ultimate purchaser as specified above for at least one year.

IT IS FURTHER ORDERED that any alteration of the equipment, parts, design, or operation of the systems certified hereby is prohibited, and is not compliant with this certification, unless such alteration has been approved by the Executive Officer or his/her designee.

IT IS FURTHER ORDERED that, upon the adoption of revised standards, an installed SaberVac VR system may continue to be used as provided in Certification Procedure CP-201, pursuant to California Health and Safety Code section 41956.1, which provides that whenever the Board revises performance or certification standards, any system or any system components certified under procedures in effect prior to the adoption of the revised standards and installed prior to the effective date of the revised standards may continue to be used in gasoline marketing operations for a period of four years after the effective date of the revised standard, provided that all necessary repair and replacement parts or components shall be certified.

Executed at Sacramento, California, this 30th day of December, 2000.

Signature on File
Michael P. Kenny
Executive Officer

Attachments